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Machine Division

Charged with the responsibility for the development and efficient operation of special machines and equipment for OCD, and for providing advisory services for CIA offices and IAC agencies on thr availability and use of machine methods and equipment for intelligence operations, the machine experts in OCD were always looking for and experimenting with new systems and/or equipment.

A few of these during the early 1950's included the following:

1. The Luhn Equipment or the [redacted] Project 25X1A9a
The Machine Division worked closely with OSI, which had originally sponsored this project with [redacted] 25X1A5a1
[redacted] personnel. 25X1A5a1
The basic approach toward identifying and recovering information was to utilize IBM cards and specialized IBM machines (developed by H. Luhn) as preparation and selection media. The code system to be utilized in this system required that five out of twelve possible positions had to be punched in each column of coded information, thus allowing approximately 750 separate meanings to be punched in each card column. This system required searching of all material contained in the file for each request. The encoding of ea word or phrase as such related it to other terminology useful for machine searching. Dr. [redacted] 25X1A5a1 and his team from OSI [redacted] spent many months in 1951/52 with OSI personnel as well as Machine Division personnel. 25X1A5a1
~~personnel, and Analysis Branch indexers, the latter for the development of a code.~~ in the "semantic factoring" type of indexing.

GROUP 1
Excluded from automatic downgrading and declassification

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By November 1952 Andrews wrote AD/OIC that he did not feel that much tangible benefit would be gained by the project and he did not approve of an extension of the contract.

25X1A5a1

2. [redacted] Coordinate Indexing

25X1A9a [redacted] attended a course at the Department of Agriculture in 1952 given by 25X1A5a1 [redacted] on coordinate indexing. This form of indexing ~~was a logical approach to~~ cards were set up for each subject encounterted, and on each card, document numbers were entered for each document that contained that subject. ~~Each card or series of cards~~ If a relationship between two subjects was required, then two cards or series of cards relating to the two subjects would be pulled and coincidemce of document numbers could be noted visually. A simple logical system, the authors stressed that it could be applied with many applications, both manually and mechanically.

25X1A9a

25X1A5a1 3. [redacted] ~~Project [redacted] ORR~~ - Rapid Selector Project

25X1A5a1 This project was carried on jointly between [redacted] ORR personnel

25X1A9a and [redacted] University. The basic idea was to combine a picture of

25X1A5a1 a document or photograph on film with a dot code pattern immediately preceding it and ~~building a machine to be known as a~~ using the Rapid Film Selector (see by 25X1A5a1 [redacted] of Dept. of Agriculture; later one of Library Consultants in 1957), capable of selecting required frames of documents or pictures through the use of an identifying mechanism, recognizing proper code dot patterns and yeilding another strip of film containing the images of the selected frames.

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~~Because the system~~
MD commented that the system would require a complete search of all material and that it would not be possible to process the film until all scanning had been completed. Therefore, the system would be too slow and cumbersome for mass production requirements.

By 1954/55 OCD had doubts that the Rapid Selector could meet the realistic but high standards required. And by this time Minicard was on the horizon and it was felt that it could do a far better job than the Rapid Selector